bod 3/8 x .0 (handwritten)

Item ID:	D2953-175	Accept
Revision ID:		
Item Name:	Spacer	

N9000040100   Setup Start *NS1*
Stop *NS2*

Start Date:	7/3/2013	**Start Qty:** 40.00	*40*
Required Date:	7/15/2013	**Req'd Qty:** 40.00	*40*

Cust Item ID:

Customer:

Reference:

Run Start *NR1*
Stop *NR2*

Approvals: Process Plan: _CX_ Date: 13/07/03 Tooling: _____ Date:_____

QC: _____ Date:_____ SPC (Y/N): _____ Date:_____

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
Draw Nbr	**Revision Nbr**								
D2953	Rev A								
100		0.00							
100	BAND SAW		DAS 40 9-89	13/07/18		40	Ø		
Hardinge		0.00							
Hardinge CNC Lathe Small	**Memo** TURN AS PER FOLIO FB065 AND DWG DWG REV:___A___ FOLIO REV:_____ DEBURR								
110	QC2- Inspect parts off machine FAI/FAIB	0.00							
110			DAS 40 9-89	13/07/18		40	Ø		
QC	**Memo**	0.00							
Quality Control									

WORK ORDER NON-CONFORMANCE / UPDATE

NCR: Yes / No

Work Order: _____	
Part No. _____	
NCR No. _____	

DISPOSITION

Rework	☐
Scrap	☐
Use-as-is	☐
Work Order Update	☐

AGAINST DEPARTMENT/PROCESS

Skid-tube ☐	Crosstube ☐	Water Jet ☐	Engineering ☐
Machining ☐	Small Fab ☐	Prod. Eng. Coor. ☐	Quality ☐
Thermoforming ☐	Finishing ☐	Rec/Store/Packaging ☐	Other ☐
Large Fab ☐	Composite ☐	Supplier ☐	☐

Root Cause	Date	Step	Qty	Description of work order update or Non-conformance	Initial Chief Eng	Action Description	Sign & Date	Verification	QC Inspector
Doc/Data ☐									
Equip/Tooling ☐									
Operator ☐									
Material ☐									
Setup ☐									
Other ☐									
Process ☐									
Supplier ☐									
Training ☐									
Unapproved ☐									

FAULT CATEGORY

Landing Gear

- ☐ Bending
- ☐ Centre Not Concentric to O/S
- ☐ Cracks
- ☐ Crushed/Crimped
- ☐ Cuffs
- ☐ Heat Treat
- ☐ Inspection Strip in Tube
- ☐ Ripples in Bend
- ☐ Torque Waves in Extrusion
- ☐ Turning Sequence
- ☐ Wave/Twist in Tube

General

- ☐ Bend
- ☐ BOM/Route
- ☐ Broken/Damaged
- ☐ Burrs
- ☐ Contamination
- ☐ Countersink
- ☐ Cut Too Short
- ☐ Drill Holes
- ☐ Drawing
- ☐ Finish
- ☐ Folio

- ☐ Grain
- ☐ Hardware
- ☐ Inspection Incomplete
- ☐ Instructions Incomplete/Unclear
- ☐ Maintenance
- ☐ Mislabeled
- ☐ Misread
- ☐ Offset
- ☐ Out of Calibration
- ☐ Out of Sequence
- ☐ Outside Dimensions

- ☐ Ovalized
- ☐ Over/Under tolerance
- ☐ Part Incorrect
- ☐ Part Lost/Missing
- ☐ Part Moved
- ☐ Positioned Wrong
- ☐ Power Loss/Surge

- ☐ Pressure/Forced
- ☐ Temperature/Cure
- ☐ Weld
- ☐ Wrong Stock Pulled
- ☐ Other

_____
_____
_____

| Item ID: | D2953-175 | | Accept | ***N9000401NN*** | Setup | Start | ***NS1*** |

Item ID: D2953-175

Revision ID:

Item Name: Spacer

Start Date: 7/3/2013   **Start Qty:** 40.00   ***40***

Required Date: 7/15/2013   **Req'd Qty:** 40.00   ***40***

Reference:

Accept

N9000401NN

Cust Item ID:

Customer:

Setup Start ***NS1***

Stop ***NS2***

Approvals: Process Plan: _____ Date: _____   Tooling: _____ Date: _____

QC: _____ Date: _____   SPC (Y/N): _____ Date: _____

Run Start ***NR1***

Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
115 ***115*** QC Quality Control	QC8- Inspect parts - second check	0.00	*ZP*	*B-7-18*		*40*	*1*		
	Memo	0.00							
120 ***120*** Packaging Packaging	Identify as per dwg & Stock Location: *WA4*	0.00	*DAS 24*			*CPC (3.7.19*	*40*		
	Memo *****STOCK IN BASKET CELL*****	0.00							
130 ***130*** QC Quality Control	QC21- Final Inspection - Work Order Release	0.00				*MCJ 13-07-22*			
	Memo	0.00							

M 13-07-19

NCR: Yes / No

WORK ORDER NON-CONFORMANCE / UPDATE

QA Closed: Date:

Work Order: _____	DISPOSITION	AGAINST DEPARTMENT/PROCESS

Work Order: _____

Part No. _____

NCR No. _____

DISPOSITION

- Rework ☐
- Scrap ☐
- Use-as-is ☐
- Work Order Update ☐

AGAINST DEPARTMENT/PROCESS

Skid-tube ☐	Crosstube ☐	Water Jet ☐	Engineering ☐
Machining ☐	Small Fab ☐	Prod. Eng. Coor. ☐	Quality ☐
Thermoforming ☐	Finishing ☐	Rec/Store/Packaging ☐	Other ☐
Large Fab ☐	Composite ☐	Supplier ☐	

Root Cause	Date	Step	Qty	Description of work order update or Non-conformance	Initial Chief Eng	Action Description	Sign & Date	Verification	QC Inspector
Doc/Data ☐									
Equip/Tooling ☐									
Operator ☐									
Material ☐									
Setup ☐									
Other ☐									
Process ☐									
Supplier ☐									
Training ☐									
Unapproved ☐									

FAULT CATEGORY

Landing Gear

- ☐ Bending
- ☐ Centre Not Concentric to O/S
- ☐ Cracks
- ☐ Crushed/Crimped
- ☐ Cuffs
- ☐ Heat Treat
- ☐ Inspection Strip in Tube
- ☐ Ripples in Bend
- ☐ Torque Waves in Extrusion
- ☐ Turning Sequence
- ☐ Wave/Twist in Tube

General

- ☐ Bend
- ☐ BOM/Route
- ☐ Broken/Damaged
- ☐ Burrs
- ☐ Contamination
- ☐ Countersink
- ☐ Cut Too Short
- ☐ Drill Holes
- ☐ Drawing
- ☐ Finish
- ☐ Folio

- ☐ Grain
- ☐ Hardware
- ☐ Inspection Incomplete
- ☐ Instructions Incomplete/Unclear
- ☐ Maintenance
- ☐ Mislabeled
- ☐ Misread
- ☐ Offset
- ☐ Out of Calibration
- ☐ Out of Sequence
- ☐ Outside Dimensions

- ☐ Ovalized
- ☐ Over/Under tolerance
- ☐ Part Incorrect
- ☐ Part Lost/Missing
- ☐ Part Moved
- ☐ Positioned Wrong
- ☐ Power Loss/Surge

- ☐ Pressure/Forced
- ☐ Temperature/Cure
- ☐ Weld
- ☐ Wrong Stock Pulled
- ☐ Other

Work Order ID:	103890			
Parent Item:	D2953-175		Start Date: 7/3/2013	Required Date: 7/15/2013
Parent Item Name:	Spacer		Start Qty: 40.00	Required Qty: 40.00
Comments:	IPP A00.03.17New IssueEC			

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
M6061T6T0.375W.058 6061-T6 RD Tube .375 x.058W		Purchased	No			100	f	190.2020	0.1458	6.1389474	DAS '40 9-89	13/07/18	

Location	Loc Qty	Loc Code
MAT014	190.202	
116920	1.156	
119087	0.11	
123303	8	
→123449	64.67	6.4
124069	8.266	
M126183	108	

NCR: Yes / No

WORK ORDER NON-CONFORMANCE / UPDATE

DQA: _____ Date: _____

QA Closed: _____ Date: _____

Work Order: _____	DISPOSITION		AGAINST DEPARTMENT/PROCESS				

Work Order: _____

Part No. _____

NCR No. _____

DISPOSITION

- Rework ☐
- Scrap ☐
- Use-as-is ☐
- Work Order Update ☐

AGAINST DEPARTMENT/PROCESS

- Skid-tube ☐
- Machining ☐
- Thermoforming ☐
- Large Fab ☐
- Crosstube ☐
- Small Fab ☐
- Finishing ☐
- Composite ☐
- Water Jet ☐
- Prod. Eng. Coor. ☐
- Rec/Store/Packaging ☐
- Supplier ☐
- Engineering ☐
- Quality ☐
- Other ☐

| Root Cause	Date	Step	Qty	Description of work order update or Non-conformance	Initial Chief Eng	Action Description	Sign & Date	Verification	QC Inspector
Doc/Data ☐									
Equip/Tooling ☐									
Operator ☐									
Material ☐									
Setup ☐									
Other ☐									
Process ☐									
Supplier ☐									
Training ☐									
Unapproved ☐									

FAULT CATEGORY

Landing Gear
- ☐ Bending
- ☐ Centre Not Concentric to O/S
- ☐ Cracks
- ☐ Crushed/Crimped
- ☐ Cuffs
- ☐ Heat Treat
- ☐ Inspection Strip in Tube
- ☐ Ripples in Bend
- ☐ Torque Waves in Extrusion
- ☐ Turning Sequence
- ☐ Wave/Twist in Tube

General
- ☐ Bend
- ☐ BOM/Route
- ☐ Broken/Damaged
- ☐ Burrs
- ☐ Contamination
- ☐ Countersink
- ☐ Cut Too Short
- ☐ Drill Holes
- ☐ Drawing
- ☐ Finish
- ☐ Folio

- ☐ Grain
- ☐ Hardware
- ☐ Inspection Incomplete
- ☐ Instructions Incomplete/Unclear
- ☐ Maintenance
- ☐ Mislabeled
- ☐ Misread
- ☐ Offset
- ☐ Out of Calibration
- ☐ Out of Sequence
- ☐ Outside Dimensions

- ☐ Ovalized
- ☐ Over/Under tolerance
- ☐ Part Incorrect
- ☐ Part Lost/Missing
- ☐ Part Moved
- ☐ Positioned Wrong
- ☐ Power Loss/Surge

- ☐ Pressure/Forced
- ☐ Temperature/Cure
- ☐ Weld
- ☐ Wrong Stock Pulled

- ☐ Other
- _____
- _____

DART AEROSPACE LTD		Work Order:	103890
Description: Spacer		Part Number:	D2953-175
Inspection Dwg: D2953 Rev: A			Page 1 of 1

FIRST ARTICLE INSPECTION CHECKLIST

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
1.75	+/-0.030	1.738	✓		VERN	P4D-12
0.375	+/-0.010	.375	✓		''	''
0.058	+/-0.010	.058	✓		''	''

Measured by:	DAS 40 9-89	Audited by:	RP	Preliminary Approval:	
Date:	13/07/18	Date:	13.7.18	Date:	

Rev	Date	Change		Revised by	Approved
A	10.04.20	New Issue		KJ	

DESIGN RF	DRAWN BY RF	DART AEROSPACE LTD
		HAWKESBURY, ONTARIO, CANADA

CHECKED	APPROVED	DRAWING NO. D2953	REV. A
			SHEET 1 OF 1

DATE 00.01.13	TITLE SPACER	SCALE 2:1

A	00.01.13	NEW ISSUE

Ø0.375 (REF)

W6103890

X.XX
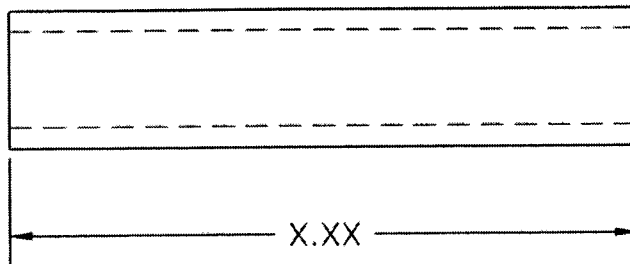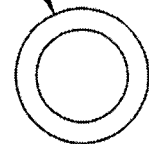
D2953-XXX

LENGTH

1.75" LONG: D2953-175
0.65" LONG: D2953-065

MATERIAL: 6061-T6 (WW-T-700/6) OR 5052-H32
(WW-T-700/4) 0.375 OD x 0.058 WALL
TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED

DQA: _____ Date: _____

WORK ORDER NON-CONFORMANCE / UPDATE

◥DART AEROSPACE

QA Closed: _____ Date: _____   Work Order update only ☐

Work Order: _____	**DISPOSITION**		**AGAINST DEPARTMENT/PROCESS**			
Part No. _____	Rework ☐	Skid-tube ☐	Crosstube ☐	Water Jet ☐	Engineering ☐	
	Scrap ☐	Machining ☐	Small Fab ☐	Prod. Eng. Coor. ☐	Quality ☐	
	Use-as-is ☐	Thermoforming ☐	Finishing ☐	Rec/Store/Packaging ☐	Other ☐	
NCR No. _____	Suspected Unapproved ☐	Large Fab ☐	Composite ☐	Supplier ☐	☐	

Root Cause	Date	Step	Qty	Description of work order update or non-conformance	Initial Chief Eng	Action Description	Sign & Date	Verification	QC Inspector
Design ☐									
Doc/Data ☐									
Equip/Tooling ☐									
Handling/Pre ☐									
Material ☐									
Operator ☐									
Offset/Setup ☐									
Process ☐									
Supplier ☐									
Training ☐									
Transport ☐									
Unapproved ☐									

FAULT CATEGORY

Landing Gear	General			
☐ Bending	☐ Bend	☐ Folio/Program	☐ Outside Dimensions	☐ Pressure/Forced
☐ Centre Not Concentric	☐ BOM/Route	☐ Grain	☐ Over/Under tolerance	☐ Set-up
☐ Cracks	☐ Broken/Damage/Defect	☐ Hardware	☐ Part Incorrect	☐ Temperature/Cure
☐ Crimp/Kink/Ripple/Wave	☐ Burrs	☐ Inspection Incomplete/Unqualified	☐ Part Lost/Missing	☐ Weld
☐ Cuffs	☐ Contamination	☐ Instructions Incomplete/Unclear	☐ Part Moved	☐ Wrong Stock Pulled
☐ Crushing	☐ Countersink	☐ Misaligned/off center	☐ Positioned Wrong	
☐ Heat Treat	☐ Cut Too Short	☐ Mislabeled	☐ Power Loss/Surge	☐ Other
☐ Inspection Strip in Tube	☐ Drawing	☐ Misread		
☐ Marks/Chatter	☐ Drill Holes	☐ Off-set	_____	
☐ Turning Sequence	☐ Finish	☐ Out of Calibration	_____	
☐ Wave/Twist in Tube	☐ Fit/Function	☐ Out of Sequence	_____	